Amendments to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application.

Claims 1-22 canceled.

- 23. (Currently amended) A photopolymerizable dental restorative material comprising: particles of filler; first monomers having thiol functional groups; second monomers having vinyl functional groups; and an initiator selected from camphorquinone and 2,2-dimethoxy-2-phenylacetophenone; wherein at least about 10% of the functional groups in the dental restorative material are thiol functional groups; and wherein the material does not contain an additional initiator; and wherein, upon exposure to light, the material cures without oxygen inhibition; and wherein after polymerization the material exhibits a flexural strength of greater than 65 Mesa Pascals.
- 24. (Previously Amended) The photopolymerizable dental restorative material of claim 23, wherein at least about 15% to about 60% of the functional groups in the dental restorative material are thiol functional groups.
- 25. (Previously Amended) The photopolymerizable dental restorative material of claim 23, wherein at least about 45% to about 55% of the functional groups in the dental restorative material are thiol functional groups.

Claims 26-28 canceled.

- 29. (Original) The photopolymerizable dental restorative material of claim 23 that when polymerized exhibits a volume shrinkage of less than 10%.
- 30. (Original) The photopolymerizable dental restorative material of claim 23 that when polymerized creates a polymer having an average weight loss, when dried, of 0.4 to 0.6% relative to an original mass before extraction.

Claim 31 canceled.

- 32. (Original) The photopolymerizable dental restorative material of claim 23 that when polymerized creates a polymer having a shrinkage stress of less that 3.0 MPa.
- 33. (Original) The photopolymerizable dental restorative material of claim 23 that when polymerized creates a polymer having a shrinkage stress of less that 1.5 MPa.
- 34. (Original) The photopolymerizable dental restorative material of claim 23 that when polymerized creates a polymer having a shrinkage stress of less that 0.5 MPa.

Claims 35-43 canceled.

- 44. (Currently amended) The photopolymerizable dental restorative material of claim 23, which is curable with visible light, wherein the initiator is-camphorquinone, and wherein, upon exposure to visible light, the material cures without oxygen inhibition.
- 45. (Previously presented) The photopolymerizable dental restorative material of claim 44, further comprising an amine accelerator.
- 46. (Previously presented) The photopolymerizable dental restorative material of claim 45, wherein the amine accelerator is ethyl 4-(dimethylamino)benzoate.
- 47. (Previously presented) The photopolymerizable dental restorative material of claim 23, which is curable with ultraviolet-light, wherein the initiator is 2,2-dimethoxy-2-phenylacetophenone.